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| APPLICATION NO.            | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|----------------------------|-------------|----------------------|---------------------|------------------|
| 10/649,567                 | 08/27/2003  | Frank D. Garber      | 0103-0036 (ZM0521)  | 5973             |
| 43231                      | 7590        | 04/06/2005           | EXAMINER            |                  |
| ZIMMER TECHNOLOGY - REEVES |             |                      | REIMERS, ANNETTE R  |                  |
| P. O. BOX 1268             |             |                      | ART UNIT            |                  |
| ALED0, TX 76008            |             |                      | PAPER NUMBER        |                  |
|                            |             |                      | 3732                |                  |

DATE MAILED: 04/06/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/649,567

Applicant(s)

GARBER ET AL.

Examiner

Annette R. Reimers

Art Unit

3732

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 18 January 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) 3-6, 9, 10, 18 and 19 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1, 2, 7, 8, 11-17 and 20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 27 August 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 08/27/03.
- ☒ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Election/Restrictions***

Applicant's election with traverse of Species I, Figure 4, in the reply filed on 01/18/05 is acknowledged. The traversal is on the ground(s) that examiner unintentionally omitted Figures 1-3 from the listing of Species. This argument is found persuasive because, in a telephone interview with applicant's representative on 01/11/05, applicant's representative and examiner reached an agreement that Figures 1-4 are appropriately included in Species I. Therefore, Species I will be examined to include Figures 1-4.

It is further acknowledged that applicant believes that claims 1-2, 7-8, 11-17 and 20 read on the elected Species. The examiner agrees with the applicant regarding all claims.

Claims 3-6, 9-10, and 18-19 are withdrawn from further consideration pursuant to 37 CFR 1.142(b), as being drawn to a nonelected species, there being no allowable generic or linking claim. Applicant timely traversed the restriction (election) requirement in the reply filed on January 12, 2005.

### ***Specification***

The specification is objected to as failing to comply with 37 CFR 1.84(p)(5), which states: "Reference characters not mentioned in the description shall not appear in the drawings. Reference characters mentioned in the description must appear in the

Art Unit: 3732

drawings." Reference number 3 is not mentioned in the detailed description. Correction is required.

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-2, 7-8, 11-14, 16 and 20 are rejected under 35 U.S.C. 102(b) as being anticipated by Noiles (U.S. Patent Number 3,848,272).

Noiles discloses an acetabular cup, e.g. 10 of figure 21, having a shell (see figure 21) and a liner, e.g. 162 of figure 21 and a means for retaining the liner in the shell including a spherical profile thread spiraling around a portion of each of the shell and liner (see figure 21 and column 8 lines 38-43). The liner includes a liner screw thread, e.g. 164 of figure 21, having a spherical profile thread crest and a spherical profile thread root, the liner thread root has a spherical profile, the shell includes a shell screw thread, e.g. 160 of figure 21, where thread crest has a corresponding spherical profile, and the shell thread root has a spherical profile for receiving the liner thread crest (see figure 21).

Noiles further discloses an acetabular cup assembly and method, a hip prosthesis system, and a method of attaching an acetabular liner to an acetabular shell including an acetabular liner having a hemispherical body with a face on one side of the body and a convex back side opposite the face, the back side having a polar region, a

Art Unit: 3732

concave bearing surface extending into the body through the face toward the polar region, the back side including a liner screw thread having a liner thread root and a liner thread crest spiraling around the back side (see figure 21) and an acetabular shell including a concave mating surface including a shell screw thread engageable with the liner screw thread (see figure 21).

In addition, the acetabular cup assembly has a self-locking arrangement (see column 8 lines 43-46 and 58-60). Furthermore the hip prosthesis system includes a femoral prosthesis including a stem portion and a head portion, the head portion being engageable with the concave bearing surface of the acetabular liner (see figure 1 and column 3 lines 30-32).

Claims 1-2, 7-8, 11-14, 16 and 20 are rejected under 35 U.S.C. 102(b) as being anticipated by English (U.S. Patent Number 4,004,300).

English discloses an acetabular cup having a shell, e.g. 16 of figure 1 and a liner, e.g. 14 of figure 1 and a means for retaining the liner in the shell including a spherical profile thread spiraling around a portion of each of the shell and liner (see figure 3 and column 4 lines 51-53). The liner includes a liner screw thread, e.g. 32 of figure 3, having a spherical profile thread crest and a spherical profile thread root, the liner thread root has a spherical profile, the shell includes a shell screw thread, e.g. 37 of figure 3, where thread crest has a corresponding spherical profile, and the shell thread root has a spherical profile for receiving the liner thread crest (see figure 3).

English further discloses an acetabular cup assembly and method, a hip prosthesis system, and a method of attaching an acetabular liner to an acetabular shell

Art Unit: 3732

including an acetabular liner having a hemispherical body with a face on one side of the body and a convex back side opposite the face, the back side having a polar region, a concave bearing surface extending into the body through the face toward the polar region, the back side including a liner screw thread having a liner thread root and a liner thread crest spiraling around the back side (see figure 3), and an acetabular shell including a concave mating surface including a shell screw thread engageable with the liner screw thread (see figure 3).

In addition, the acetabular cup assembly has a self-locking arrangement (see column 4 lines 51-53). Furthermore the hip prosthesis system includes a femoral prosthesis including a stem portion and a head portion, the head portion being engageable with the concave bearing surface of the acetabular liner (see figure 1 and column 4 lines 38-43).

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Noiles (U.S. Patent Number 3,848,272) in view of Park (U.S. Patent 4,491,987). Noiles discloses the claimed invention except for the hip prosthesis system including bone cement positionable between the shell and acetabulum. Park discloses a device comprising bone cement positionable between the shell and acetabulum (see figure 1).

Art Unit: 3732

Park teaches that bone cement provides a mechanism of attachment of the prosthesis to the bone (see column 4 lines 11-12 and 55-57). It would have been obvious to one skilled in the art at the time the invention was made to construct the device of Noiles with bone cement positionable between the shell and acetabulum in view of Park, in order to provide a mechanism of attachment between the shell and the acetabulum.

Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over English (U.S. Patent Number 4,004,300) in view of Park (U.S. Patent 4,491,987). English discloses the claimed invention except for the hip prosthesis system including bone cement positionable between the shell and acetabulum. Park discloses a device comprising bone cement positionable between the shell and acetabulum (see figure 1). Park teaches that bone cement provides a mechanism of attachment of the prosthesis to the bone (see column 4 lines 11-12 and 55-57). It would have been obvious to one skilled in the art at the time the invention was made to construct the device of English with bone cement positionable between the shell and acetabulum in view of Park, in order to provide a mechanism of attachment between the shell and the acetabulum.

#### ***Allowable Subject Matter***

Claim 17 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

#### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. See PTO 892 for art cited of interest.

Art Unit: 3732

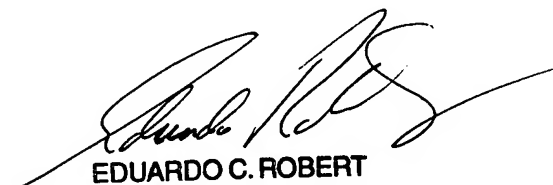
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Annette R. Reimers whose telephone number is (571) 272-7135. The examiner can normally be reached on Monday-Friday, 9:00AM-6:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kevin Shaver can be reached on (571) 272-4720. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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EDUARDO C. ROBERT  
PRIMARY EXAMINER